



SEQUENCE LISTING

<110> BRIESE, THOMAS
LIPKIN, W. IAN
PALACIOS, GUSTAVO
JABADO, OMAR

<120> METHODS AND KITS FOR DETECTING SARS-ASSOCIATED
CORONAVIRUS

<130> 19240-447-US2

<140> 10/764,075

<141> 2004-01-23

<150> 60/463,704

<151> 2003-04-17

<160> 43

<170> PatentIn Ver. 3.3

<210> 1

<211> 1136

<212> DNA

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence: Synthetic
nucleic acid sequence that includes the 3'
non-coding region and a portion of the N gene
of the SARS-associated coronavirus genome

<400> 1

```
aggcatcgta tgggttgcaa ctgaggggagc cttgaataca cccaaagacc acattggcac 60
ccgcaatcct aataacaatg ctgccaccgt gctacaactt cctcaaggaa caacattgcc 120
aaaaggcttc tacgcagagg gaagcagagg cggcagtgcaa gcctcttctc gctcctcatc 180
acgtagtcgc ggtaattcaa gaaattcaac tcctggcagc agtaggggaa attctcctgc 240
tcgaatggct agcggagggtg gtgaaactgc cctcgcgcta ttgctgctag acagattgaa 300
ccagcttgag agcaaagttt ctggttaaagg ccaacaacaa caaggccaaa ctgtcactaa 360
gaaatctgct gctgaggcat ctaaaaagcc tcgccccaaa cgtactgcca caaaacagta 420
caacgtcact caagcatttg ggagacgtgg tccagaacaa acccaaggaa atttcgggga 480
ccaagaccta atcagacaag gaactgatta caaacattgg cgcgaaattg cacaatttgc 540
tccaagtgcc tctgcattct ttggaatgtc acgcattggc atggaagtca caccttcggg 600
aacatggctg acttatcatg gagccattaa attggatgac aaagatccac aattcaaaga 660
caacgtcata ctgctgaaca agcacattga cgcatacaaa acattcccac caacagagcc 720
taaaaaggac aaaaagaaaa agactgatga agctcagcct ttgccgcaga gacaaaagaa 780
gcagcccact gtgactcttc ttcctgcggc tgacatggat gatttctcca gacaacttca 840
aaattccatg agtggagctt ctgctgattc aactcaggca taaacactca tgatgaccac 900
acaaggcaga tgggctatgt aaacgttttc gcaattccgt ttacgataca tagtctactc 960
ttgtgcagaa tgaattctcg taactaaaca gcacaagtag gtttagttaa ctttaattctc 1020
acatagcaat ctttaatcaa tgtgtaacat tagggaggac ttgaaagagc caccacattt 1080
tcatcgaggc cagcggaggt acgatcgagg gtacagtga taatgctagg gagagc 1136
```

<210> 2
 <211> 21
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 2
 atgaccacac aaggcagatg g 21

<210> 3
 <211> 24
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 3
 gctctcccta gcgttattca ctgt 24

<210> 4
 <211> 21
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 4
 cacaaggcag atgggctatg t 21

<210> 5
 <211> 23
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 5
 gctctcccta gcgttattca ctg 23

<210> 6
 <211> 24
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 6
 ttctcatcgag gccacgcgga gtac 24

 <210> 7
 <211> 24
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 7
 gctctcccta gcattattca ctgt 24

 <210> 8
 <211> 20
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 8
 aaacgttttc gcaattccgt 20

 <210> 9
 <211> 23
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 9
 ggcagctctc cctagcatta ttc 23

 <210> 10
 <211> 22
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 10
 tcgatcgtac tccgcgtggc ct 22

<210> 11
 <211> 19
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Synthetic
 primer

<400> 11
 aggcacgta tgggttgca

19

<210> 12
 <211> 22
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Synthetic
 primer

<400> 12
 gaagcctttt ggcaatgttg tt

22

<210> 13
 <211> 28
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Synthetic
 primer

<400> 13
 agggagcctt gaatacaccc aaagacca

28

<210> 14
 <211> 20
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Synthetic
 primer

<400> 14
 aagcctcgcc aaaaacgtac

20

<210> 15
 <211> 20
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 15
 aagtcagcca tgttcccgaa 20

 <210> 16
 <211> 25
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 16
 tcacgcattg gcatggaagt cacac 25

 <210> 17
 <211> 19
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 17
 cagagccatg cctaacatg 19

 <210> 18
 <211> 20
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 18
 aatgtttacg caggtaagcg 20

 <210> 19
 <211> 18
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

<400> 19
tgttaaacca ggtggaac 18

<210> 20
<211> 18
<212> DNA
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Synthetic
primer

<400> 20
cctgtgttgt agattgcg 18

<210> 21
<211> 24
<212> DNA
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Synthetic
primer

<400> 21
atgaattacc aagtcaatgg ttac 24

<210> 22
<211> 22
<212> DNA
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Synthetic
primer

<400> 22
cataaccagt cggtagagct ac 22

<210> 23
<211> 20
<212> DNA
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Synthetic
primer

<400> 23
gaagctattc gtcacgttcg 20

<210> 24
 <211> 22
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 24
 ctgtagaaaa tcctagctgg ag 22

 <210> 25
 <211> 21
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 oligonucleotide

 <400> 25
 cccgacgagt tcgtggtggt g 21

 <210> 26
 <211> 26
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 oligonucleotide

 <400> 26
 gcgttacaca ttagggctct tccata 26

 <210> 27
 <211> 17
 <212> DNA
 <213> Artificial Sequence

 <220>
 <223> Description of Artificial Sequence: Synthetic
 primer

 <400> 27
 gagccatgcc taacatg 17

 <210> 28
 <211> 10
 <212> DNA
 <213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Synthetic
primer

<400> 28
gtagattgcg 10

<210> 29
<211> 20
<212> DNA
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Synthetic
primer

<400> 29
aatgtttacg caggtaagcg 20

<210> 30
<211> 13
<212> DNA
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Synthetic
primer

<400> 30
atcctagctg gag 13

<210> 31
<211> 22
<212> DNA
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Synthetic
primer

<400> 31
cataaccagt cggtacagct ac 22

<210> 32
<211> 15
<212> DNA
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Synthetic
primer

<400> 32
gaagcctttt ggcaa 15

<210> 33
 <211> 19
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Synthetic
 primer

<400> 33
 aagtcagcca tggtcccgga

19

<210> 34
 <211> 18
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Synthetic
 primer

<400> 34
 accacacaag gcacatgg

18

<210> 35
 <211> 23
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Synthetic
 primer

<400> 35
 ctctccctag cggtattcac tgt

23

<210> 36
 <211> 22
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Synthetic
 primer

<400> 36
 ctctccctag cggtattcac tg

22

<210> 37
 <211> 23
 <212> DNA
 <213> Artificial Sequence

<220>

<223> Description of Artificial Sequence: Synthetic primer

<400> 37

ctctccctag cattattcac tgt

23

<210> 38

<211> 18

<212> DNA

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence: Synthetic primer

<400> 38

ctctccctag cattattc

18

<210> 39

<211> 22

<212> DNA

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence: Synthetic primer

<400> 39

tcgatcgtac tccgcgtggc ct

22

<210> 40

<211> 120

<212> DNA

<213> SARS Coronavirus

<400> 40

ttattagggt tttacctacc caggaaaagc caaccaacct cgatctcttg tagatctgtt 60
ctctaaacga actttaaaat ctgtgtagct gtcgctcggc tgcattgccta gtgcacctac 120

<210> 41

<211> 720

<212> DNA

<213> SARS Coronavirus

<400> 41

gtactatgac aaatagacag tttcatcaga aattattgaa gtcaatagcc gccactagag 60
gagctactgt ggtaattgga acaagcaagt tttacgggtg ctggcataat atgttaaaaa 120
ctgtttacag tgatgtagaa actccacacc ttatgggttg ggattatcca aaatgtgaca 180
gagccatgcc taacatgctt aggataatgg cctctcttgt tcttgctcgc aaacataaca 240
cttgctgtaa cttatcacac cgtttctaca ggtagctaa cgagtgtgcg caagtattaa 300
gtgagatggt catgtgtggc ggctcactat atgttaaacc aggtggaaca tcatccggtg 360
atgctacaac tgcttatgct aatagtgtct ttaacatttg tcaagctgtt acagccaatg 420

```

taaatgcact tctttcaact gatggtaata agatagctga caagtatgtc cgcaatctac 480
aacacaggct ctatgagtgt ctctatagaa atagggatgt tgatcatgaa ttcgtggatg 540
agttttacgc ttacctgcgt aaacatttct ccatgatgat tctttctgat gatgccgttg 600
tgtgctataa cagtaactat gcggtcgaag gtttagtagc tagcattaag aactttaagg 660
cagttcttta ttatcaaaat aatgtgttca tgtctgaggc aaaatgttgg actgagactg 720

```

<210> 42

<211> 480

<212> DNA

<213> SARS Coronavirus

<400> 42

```

gtagtaagat cattactggg cttcatccta cacaggcacc tacacacctc agcgttgata 60
taaagttcaa gactgaagga ttatgtgttg acataccagg cataccaaag gacatgacct 120
accgtagact catctctatg atgggtttca aaatgaatta ccaagtcaat ggttacccta 180
atatgtttat caccgcgaa gaagctattc gtcacgttcg tgcgtggatt ggctttgatg 240
tagagggtcg tcatgcaact agagatgctg tgggtactaa cctacctctc cagctaggat 300
tttctacagg tgtaactta gtagctgtac cgactgggta tgttgacact gaaaaataaca 360
cagaattcac cagagttaat gcaaaacctc caccaggtga ccagtttaaa catcttatac 420
cactcatgta taaaggcttg ccctggaatg tagtgcgtat taagatagta caaatgctca 480

```

<210> 43

<211> 1347

<212> DNA

<213> SARS Coronavirus

<400> 43

```

taccgaagag ctacccgacg agttcgtggg ggtgacggca aaatgaaaga gctcagcccc 60
agatgggtact tctattacct aggaactggc ccagaagctt cacttcccta cggcgctaac 120
aaagaaggca tcgtatgggt tgcaactgag ggagccttga atacacccaa agaccacatt 180
ggcaccgcga atcctaataa caatgctgcc accgtgctac aacttctca aggaacaaca 240
ttgccaaaag gcttctacgc agaggggaagc agaggcggca gtcaagcctc ttctcgctcc 300
tcatcacgta gtcgcggtaa ttcaagaaat tcaactcctg gcagcagtag gggaaattct 360
cctgctcgaa tggctagcgg aggtggtgaa actgcctcgc cgctattgct gctagacaga 420
ttgaaccagc ttgagagcaa agtttctggg aaaggccaac aacaacaagg ccaaactgtc 480
actaagaaat ctgctgctga ggcattctaa aagcctcgcc aaaaacgtac tgccacaaaa 540
cagtacaacg tcaactcaagc atttgggaga cgtgggtccag aacaaacca aggaaatttc 600
ggggaccaag acctaatcag acaaggaact gattacaaac attggccgca aattgcacaa 660
tttgctccaa gtgcctctgc attctttgga atgtcacgca ttggcatgga agtcacacct 720
tcgggaacat ggctgactta tcatggagcc attaaattgg atgacaaaga tccacaattc 780
aaagacaacg tcatactgct gaacaagcac attgacgcat acaaaacatt cccaccaaca 840
gagcctaaaa aggacaaaaa gaaaaagact gatgaagctc agcctttgcc gcagagacaa 900
aagaagcagc ccactgtgac tcttcttctc gcggtgaca tggatgattt ctccagacaa 960
cttcaaaatt ccatgagtgg agcttctgct gattcaactc aggcataaac actcatgatg 1020
accacacaag gcagatgggc tatgtaaacg ttttcgcaat tccgtttacg atacatagtc 1080
tactcttggt cagaatgaat tctcgtaact aaacagcaca agtaggttta gttacttta 1140
atctcacata gcaatcttta atcaatgtgt aacattaggg aggacttgaa agagccacca 1200
cattttcatc gaggccacgc ggagtagcat cgagggtaca gtgaataatg ctagggagag 1260
ctgcctatat ggaagagccc taatgtgtaa aattaatttt agtagtgcta tccccatgtg 1320
attttaatag cttcttagga gaatgac

```